

THE JUVENILE INSTRUCTOR.

HOLINESS TO THE LORD.



VOL 10.

SALT LAKE CITY, APRIL 3, 1875.

NO. 7.

THE CABMEN OF ST. PETERSBURG.

PERHAPS no city in Europe has such an imposing appearance as St. Petersburg. As we sail up the broad, clear Neva, we are at once struck by the splendid rows of white mansions which line the granite quays, by the vast quantity of shipping, by the superb and colossal public buildings, by the stately bridge, and, above all, by the gilded domes and spires of the numerous churches which glitter and sparkle as the rays of the setting sun fall upon them.

We land, and at once forget the splendors upon which we have been gazing, in the struggles and vexations which attend the custom-house examination, which takes place in an open shed on the quay. Escaping from it, baggage in hand, we make our way on the road, where we are at once surrounded by a crowd of wild and savage-looking beings in a most quaint dress, who all yell a strange jargon in our ears, while they fight, push, and struggle with one another for the possession of our persons and property; endeavoring to drag us towards a row of vehicles different in shape from any we have before seen in Europe.

These wild-looking beings are the *Isvostchiks*, or cabmen of St. Petersburg, and their conveyances are called *droskies*. The appearance of both is rather startling to a stranger upon his first arrival in the Russian capital. The men are of the regular Mongolian type, dark-complexioned, with somewhat round, flat faces, small, black, sparkling eyes, and huge, tangled beards. They are all dressed exactly alike, in the dark caftan or coat, tight at the waist and loose in the skirts, something like a dressing-gown, of black or dark blue cloth, and coming down to the heels. There is generally a long row of buttons down the front, while a broad sash, which once has been of some bright color, encircles the waist. Each man wears a hat or cap of very peculiar shape, and high boots, which reach to the knee. In winter he puts on a long thick sheep-skin coat instead of the cloth caftan.

His small shaky vehicle may be best imagined from our picture. A Russian drosky will hold two persons at a great pinch, but only one can ride in it with comfort. They tear along at a tremendous pace over the paved streets of the capital, and one frequently has to hold hard on to the side to prevent being jerked out.

No city in Europe covers such a vast area as St. Petersburg. All the streets and squares are of immense length and width, the distance being thus very great, and the Russians not being fond of walking, these droskies are much more used than the hackney-carriages of any other European capital. A traveler in giving his experience in St. Petersburg says:

"There are no fixed fares, and, on hiring a drosky, the first thing we have to do is, to make a bargain with the driver. They will generally take us cheaply enough, but woe betide us if we do not make the arrangement previous to our drive! On one occasion I bargained with an *isvostchik* to take me from my hotel to the Moscow railway-station for half a ruble. On returning, as there was a good deal of confusion at the station, and some difficulty in securing a drosky, I jumped into the first I could get, and ordered the driver to take me to the same hotel. It was



not long before I discovered that he was drunk, as these men often are, and when he got half way down the long street Neoski, he turned back, pretending he did not know where I had told him to drive to. I then took him by the shoulders and shook him (a perfectly allowable proceeding in Russia toward refractory cabmen), and made him again go on in the right direction. I finally appealed to a policeman, and after various stoppages, arrived at last at the hotel, where the *isvostchik* demanded two rubles, four times his right fare; I gave him one, which he refused to take, so I left it for him in the passage, where he remained making a terrible noise outside my room, and threatening to summon me before the

police, for about two hours, when getting tired, and finding that neither threats nor entreaties would move me, he departed."

The German traveler Kohl gives an amusing account of these droskies and their drivers: "If a man stand still for a moment and seem to deliberate in his own mind upon the expediency of summoning a charioteer, the hint is quite sufficient, and half-a-dozen immediately come darting up to the spot where he stands. The bags are quickly thrown aside, the harness drawn tight, and each of the rival candidates for his patronage shout at him, 'Where to sir?'—'To the admiralty?' 'I'll go for two rubles.' 'I for one and a half,' cries another, and so they go on under-bidding each other, till they come down perhaps to half-a-ruble.

"You take the cheapest, but beware lest the cheapest be the worst; or you must be prepared for a volley of jokes and banterings from the disappointed applicants. 'Ah, do but look, little father, how stingy you are! To save a few coopeks, you put up with that ragged rascal for your coachman; he and his three-legged nag will stick fast before you get half away.' 'The gray-bearded vagabond will be sure to upset you.' No one enjoys all this abuse meanwhile more than the cabman who has secured the fare, who laughs in his sleeve, and jerks out his *nitsheoons*. 'Never fear, sir, we shall get on well enough.'"

In winter the droskies are turned into sledges, and the *isvostchik* continues to grind the pavement as long as there is the least trace of snow. A covered carriage he never uses; cloaks and furs do the same service for the Russians that the roof of the coach does for us.

The *isvostchik* often pass all the night in the streets, their sledge or drosky serving them at once as house and bed. Arrangements for their convenience are made in every street. Here and there mangers are erected for their use; to water their horses there are in all parts of the town convenient descents to the canal or to the river. To stop the thirst and hunger of the charioteers themselves, there are wandering dealers in quass, tea, and bread, who constantly attend to their wants. The animals are as hardy as their masters. Neither men nor nags care for cold nor rain, both eat as they have the chance, and both are content to take their sleep when it comes. They are always cheerful, the horses ever ready to start off at a smart trot, the drivers at all times disposed for a song, a joke, or a gossip. When several of them happen to be together, they are sure to be engaged in some game or other—pelting with snow-balls, wrestling, or bantering. In winter, when they have to wait of a night outside the places of amusement, they make themselves comfortable around the large fires which are kindled for their use, under covered iron sheds in the centers of the squares.

Russian coachmen, to whatever noble family they belong, never wear a livery; they are always arrayed in the same long blue caftan as the *isvostchik*, but, of course, it is of very superior make and quality. Indeed a Russian coachman, such as we see him in our picture, is a most imposing looking person, and has quite an ecclesiastical air.

Professor Smyth gives an excellent description of him; he says: "You see on the box of every Russian carriage a man of majestic proportions: his countenance is grandly stern and sedate, and adorned with the beard of wisdom. His vesture consists of a long flowing robe of dark blue cloth, diagonally folding in front, belted with a silk sash, in which, during summer, his large gloves are stuck, and covered as to his head with a broad-brimmed shovel-hat, as though he were an English bishop; and when the signal is given, he merely raises the reins, and instantly the horses start off at full speed.

Away go the horses forward, and away go the milestones in the opposite direction, yet no whip reveals itself, no fussy excitement is indulged in, you merely see the statuelike man holding out the reins with both hands, at arm's length before him; and he then appears the very high priest of driving, benignantly extending forward to dispense the blessings of locomotion for the good of humanity."

A SHIP ON FIRE.

From the 20th Ward Institute Index.

BY J. R. HOWARD.

THE *Eastern Monarch*, from Bombay to London, with invalids from the Sepoy rebellion, had a prosperous voyage home, until, going up the Channel, she came to anchor at Spithead on the morning of the 3rd of June, 1859. At that time I was on board H. M. S. sloop *Falcon* under sailing orders for Madeira. About half past one in the morning the quartermaster of the watch came to the first lieutenant, Mr. Strong, and reported a ship on fire. Sleeping in my berth, I happened to hear the word "fire," and did not stop to think what ship was on fire, but got my clothes on as fast as I could, for I certainly thought it was our ship. I aroused those who were near me, and ran on deck. Just then the fire-bell was rung, and I looked around for the fire, and made inquiries concerning it. I did not know at the time that a fine large ship had come to anchor but an hour before with about five hundred sick and wounded soldiers on board.

I looked out of the gangway, and there, sure enough, was a majestic looking vessel, with a small column of smoke ascending from her main hatchway. By this time all was activity on board our ship. Minute guns were fired to alarm the ships in the harbor of Portsmouth, and in the meantime our men worked with almost superhuman strength. The quarter boats were lowered, and the dingy was thrown out of the pinnace by the pinnace's crew; the captain, A. J. Fitz Roy, gave orders to throw her out, and out she went on the starboard guns. The pinnace went over the side quicker than I ever saw any other boat leave a ship before or since, for she was launched from the middle of the upper deck, with all her crew, numbering fifteen men, and it was done in less time than it takes me to tell you. At the same time a number of small boats went alongside of the burning ship and took several persons off her, and our boats towed them to a place of safety.

The fire, in about fifteen or twenty minutes, had obtained complete possession of the ship. It ran along her main deck, belched out of her port holes and flew up the rigging. The people on board were driven forward, and succeeded in gaining the boats from the bowsprit end, and also from the spanker boom and the after part of the ship.

The *Falcon*, after firing her guns as a signal of distress, got up steam, slipped her cable and stood as near as she could to the burning vessel, so that our boats could convey on board as many as possible; in fact, we went so near that the tar on our rigging dripped down like rain from the heat of the wreck, as wreck she was by this time.

It was a grand sight to see a majestic ship lying at anchor all ablaze. When the fire took possession of the upper deck it ran up the cordage and along the yards, wreathing in flames all of her sails. The hull, spars, sails and rigging all on fire at once made a scene of terrible grandeur, and one never to be forgotten by those who beheld it.

On board of our ship, besides those towed to a safe distance by our boats, were between two and three hundred souls, of whom twenty-five were women, to whom I issued blankets to cover them, as they were almost in a state of nudity.

I have since been told that the greatest consternation prevailed at Portsmouth on account of our firing minute guns, as the people on shore did not know of the arrival of the *Eastern Monarch*, and thought it was our ship that was on fire. Thousands came down to the beach to see the burning ship, and those who had relatives on board were in the greatest distress through fear and anxiety for their safety.

The night signals soon quieted the fears of the port admiral respecting our safety, and the report soon spread among the anxious multitude of people assembled on South Sea Beach that it was not the *Falcon* that was on fire. Then came the anxious inquiries: "What ship is it? Is she a man-of-war, or a merchant ship? How many poor souls are on board?"

All this time we were working with all our might to save the passengers and crew; and I feel thankful that we were so fortunate as to save so many, only eight persons being lost.

During the day steam vessels came from the harbor and conveyed the rescued people to Portsmouth. Those were taken first who were in the boats and small craft, while those on board our vessel were the last to be taken to the harbor.

We were under orders for sea, as I have before stated, and when the steamer came along-side of us to take the passengers we had rescued from the wreck, our anchor was hove short, and, our steam being up already to start on our voyage, as soon as all of them were transferred to the craft alongside, we tripped our anchor, and, as we steamed for the English Channel, the other vessel was steering away for Portsmouth.

As soon as we were in motion those bound for the harbor gave us three of the heartiest cheers I ever heard. You can form some idea of them, coming as they did from those who, in all probability, would either have been roasted alive or have met with a watery grave, but for our timely aid. Three hundred human beings giving vent to their gratitude in that good old English style—three hearty British cheers, which always will find an answering echo in every Anglo-Saxon breast.

JELLY FROM OLD BOOTS.—The reader may stare, but science smiles supreme and asserts very emphatically that a toothsome delicacy can be made from a delapidated foot covering. Some time ago, says the *Scientific American*, Doctor Vander Weyde regaled some friends not merely with boot jelly, but with shirt coffee, and the repast was pronounced by all partakers excellent. The doctor tells us that he made the jelly by first cleaning the boot, and subsequently boiling it with soda, under a pressure of about two atmospheres. The tannic acid in the leather, combined with salt, made tannate of soda, and the gelatine rose to the top, whence it was removed and dried. From this last, with suitable flavoring material, the jelly was readily concocted.

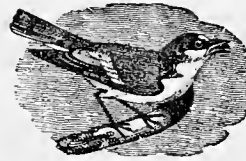
The shirt coffee incidentally mentioned above, was sweetened with cuff and collar sugar, both coffee and sugar being produced in the same way. The linen (after washing, of course) was treated with nitric acid, which, acting on the lignite contained in the fibre, produced glucose, or grape sugar. This roasted, made an excellent imitation coffee, which an addition of unroasted glucose readily sweetened.

THERE is no courage, but in innocence; no constancy, but in an honest cause.

BIRDS.

THE FLYCATCHER.

THE interesting family of Flycatchers is composed of a large number of species, extremely variable in size, form and color. The average dimensions of these birds are about equal



THE FLYCATCHER.

to those of a large sparrow, and many are smaller than that bird, although two or three species nearly equal the thrush in size. Their shape is always neat and elegant, and their plumage sits closely on the body, in order to permit the short but rapid evolutions which they make in pursuit of their active prey. One or two, such as the Paradise and Fork tailed Flycatchers, are remarkable for the mode in which the tail is elongated into a graceful and elegant trail, and in other species the tail is broad and fan-like.

THE KINGFISHER.

THE common Kingfisher is by far the most gorgeously decorated of all indigenous birds of North America, and can bear comparison with many of the gaily decorated inhabitants of tropical climates. Seated upon

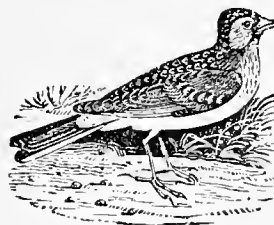


THE KINGFISHER.

a convenient bough or rail, that overhangs a stream where the smaller fish love to pass, the Kingfisher waits very patiently until he sees an unsuspecting minnow or stickleback pass below his perch, and then, with a rapid movement, drops into the water and secures his prey. Should it be a small fish, he swallows it at once; but if it should be of rather larger dimensions, he carries it to a stone or stump, beats it two or three times against the hard substance, and then swallows it without any trouble.

THE LARK.

ALTHOUGH it is by no means a familiar bird, nor does it seek the society of human beings, it is marvelously indifferent to their presence, and exhibits no discomposure at the close



THE LARK.

vicinity of the laborer, springing from the ground close to his feet, and singing merrily as it passes by his face. When pressed by danger, it has even been known to place itself under human protection. A gentleman was once riding along a road, when a Skylark suddenly dropped on the pommel of his saddle, where it lay with outstretched wings, as if wounded to death. When the rider tried to take it up, it shifted around the horse, and finally dropped between the legs of the horse, where it lay cowering, evidently smitten with terror. On looking up, the rider saw a hawk hovering above, evidently waiting to make its stoop as soon as the Lark left her place of refuge. The Lark presently remounted the saddle, and, taking advantage of a moment when the hawk shifted its position, sprang from the saddle and shot into the hedge, where it was safe.

(To be Continued.)

THE ART OF COINING.

BY R. J. FILCE, KAYSVILLE.

(Continued.)

GAUGES were formerly made of steel, and had nicks in them the same shape as the letter V, with an engraved index down each side, the gradation being very fine, so that the thinner the metal the lower down the gauge it would go. They were finally superseded and became a thing of the past in the year 1854. An improved gauge was then brought out, which would detect the slightest deviation in the thickness of the metal. It was formed thus: a convenient ivory handle, with a round brass index dial placed over a narrow box containing a steel spring and a single train of wheels, like the movement of a Geneva watch, with a blue steel index finger; attached to the spring were a pair of extended jaws, like a pair of pliers, with the ends turned in towards each other at right angles, with a diamond inserted in each end, to prevent any perceptible change in the index by the wearing of the points. There are many other shaped metal gauges in use, which are fine enough for common work. The necessity arose for improvement on the old style of gauge through the vast improvement made in the art of metal rolling.

It now became absolutely necessary that an improvement should be made in weights and scales, for up to this time everyone had been satisfied by dividing one grain into four, and working to a quarter of a grain, and having scales only sufficiently fine to turn slowly at that small weight. Seeing that our new gauges would act at a deviation of the six hundredth part of a grain, it was imperative that our smallest weights should be greatly reduced, which was done by dividing one grain into two thousand parts, and having scales under glass shades, to prevent the least vacillation through the action of the atmosphere. The weights were made of a metal called aluminum. This metal is almost as light as cork; it was first introduced in the year 1855, and is made from clay which is an oxide of that metal.

The gold, having been sufficiently rolled, is passed through a pair of fixed cylinders, as hard as flint and as bright as steel can be polished, for the purpose of remedying any little defect that may remain after the rolling. This is done by means of a draw bench and an endless chain. The cylinders are first set at a certain distance from each other by means of screws and levers. They are placed just a shade nearer together than the thickness of the metal, the end of the strip of metal being first reduced to one half its original thickness by being placed in reversible rollers, so that the end may be easily admitted in between the fixed cylinders, a firm grip being had from the other side. The metal being hooked on to the revolving endless chain, is now drawn through, and, being completely level and equal in thickness from one end to the other, it is then conveyed into the cutting-out room.

The cutting-out process has been carried on for many years by means of small presses having a piece of hardened steel with a hole in it the size of the blank required, and brought up to a sharp edge at the top of the hole. Another piece of steel, called a punch, firmly screwed into a square bolt, is forced down by means of a large square-threaded screw, and drawn up again by a rod connected with a vacuum pump. Thus the punch is forced in and out of the fixed bed, the metal being placed and guided by one man. The blanks are cut out one at a time at each press, at the rate of sixty per minute, while the tools remain in good order, which is not

generally very long at a time. The room this operation was usually performed in where I was employed was round, and about forty feet in diameter, having twenty men attending to twenty single steam presses, and four attendants—two men and two boys, to wait upon them, making twenty-four in all, to cut out five hundred and seventy-six thousand blanks per day of ten hours, deducting two hours per day for repairing tools.

By very recent improvements a machine is in use operated by one little boy, and occupying a space but two feet square, that will make three hundred revolutions per minute, cut out eleven blanks at a time, require but thirty minutes per day for repairing tools, and take no time to learn to attend it, thus cutting out one hundred and eighty-eight thousand one hundred blanks per day. A one-horse power engine is sufficient to drive the improved machine, instead of thirty-horse power as formerly required.

But these advantages have some attendant evils, as I had occasion to learn. At a time of excitement, caused by great pressure of business, for the machinery was kept in motion day and night, coining forty-eight thousand tons of money for the king of Sardinia, to supply his newly-acquired kingdom with, there was an average loss of one finger per week from the hands of the employes, by these machines, for the space of six months.

I may here mention one fact which is worthy of note, that is, that at the mint in Birmingham, England, under my own supervision, in the year 1864, was manufactured four hundred tons of good coin in the space of forty days, averaging ten tons per day, a feat never known before or since in the annals of coining.

(To be Continued.)

IT'S QUITE TRUE!

"THAT is a terrible affair!" said a hen; and she said it in a quarter of the town where the occurrence had not happened. "That is a terrible affair in the poultry-house. I cannot sleep alone to-night! It is quite fortunate that there are many of us on the roost together!" and she told a tale, at which the feathers of the other birds stood on end, and the cock's comb fell down flat. It's quite true!

But we will begin at the beginning; and the beginning begins in a poultry-house in another part of the town. The sun went down, and the fowls jumped up on their perch to roost. There was a hen, with white feathers and short legs, who laid her right number of eggs, and was a respectable hen in every way; as she flew up on the roost, she pecked herself with her beak, and a little feather fell out.

"There it goes!" said she; "the more I peck myself the handsomer I grow!" And she said it quite merrily, for she was a joker among the hens, though, as I have said she was very respectable; and then she went to sleep.

It was dark all around, hen sat by hen, but the one next to the merry hen did not sleep; she heard and she didn't hear, as one should do in this world if one wishes to live in quiet; but she could not refrain from telling it to her next neighbor.

"Did you hear what was said here just now? I name no names; but here is a hen that wants to peek her feathers out to look well. If I were a cock I should despise her."

And just above the hens sat the owl, with her husband and the little owlets; the family had sharp ears, and they all heard every word that the neighboring hen had spoken, and

they rolled their eyes, and mother-owl clapped her wings and said.

"Don't listen to it! But: I suppose you heard what was said there? I heard it with my own ears, and one must hear much before one's ears fall off. There is one among the fowls who has so completely forgotten what is becoming conduct in a hen that she pulls out all her feathers, and then lets the cock see her."

"*Prenez garde aux enfants,*" said the father Owl. "That's not fit for the children to hear."

"I'll tell it to the neighbor owl; she's a very proper owl to associate with." And she flew away.

"Hoo! hoo! to-whoo!" they both screeched in front of the neighbor's dovecote to the doves within. "Have you heard it? Have you heard it?" Hoo! hoo! there's a hen that has pulled out all of her feathers for the sake of the cock. She'll die with cold, if she's not dead already."

"Cool! cool! Where, where?" cried the pigeons.

"In the neighbor's poultry-yard. I've as good as seen it myself. It's hardly proper to repeat the story, but it's quite true!"

"Believe it! believe every single word of it!" cooed the pigeons, and they cooed down into their own poultry-yard. "There's a hen, and some say that there are two of them that have plucked out all their feathers, that they may not look like the rest, and that they may attract the cock's attention. That's a bold game, for one may catch cold and die of a fever, and they are both dead."

"Wake up! wake up!" crowed the cock, and he flew up on to the plank; his eyes were still very heavy with sleep, but yet he crowed. "Three hens have died of an unfortunate attachment to a cock. They have plucked out all their feathers. That's a terrible story. I won't keep it to myself; let it travel farther."

"Let it travel farther!" piped the bats; and the fowls clucked and the cocks crowed. "Let it go farther! let it go farther!" And so the story traveled from poultry-yard to poultry-yard, and at last came back to the place from which it had gone forth.

"Five fowls," it was told, "have plucked out all their feathers to show which of them have become thinnest out of love to the cock; and then they have peeked each other, and fallen down dead, to the shame and disgrace of their families, and to the great loss of the proprietor."

And the hen that had lost the little loose feather, of course did not know her own story again; and as she was a very respectable hen, she said:

"I despise those fowls; but there are many of that sort. One ought not to hush up such a thing, and I shall do what I can that the story may get into the papers, and then it will be spread over all the country, and that will serve those fowls right, and their families too."

It was put into the newspaper; it was printed; and it's quite true—that one little feather may swell till it becomes five fowls.—

Selected.

A SCHOOLBOY being asked by his teacher how he should chastise him, replied: "If you please sir, I should like to have it after the Italian system of penmanship—the heavy strokes upwards, and the down strokes light."

"THE proper study of mankind is man," says Pope; but the popular study is how to make money out of him.

Correspondence.

SMITHFIELD, CACHE CO.,

March 23, 1875.

Editor Juvenile Instructor:

Dear Brother:—Your paper being devoted to the interest of Sabbath Schools and the young generally, I take pleasure in giving you a short account of a Sunday School Exhibition, held on the evenings of the 21st and 22nd inst. The first evening was occupied in catechising the various classes, on Church History, Bible and New Testament History; Book of Mormon History, Questions and Answers now being published in the JUVENILE INSTRUCTOR, United Order of Zion, &c. Several of the songs of Zion were sung by the school. The Secretary read a report which showed that there were in the school ten male teachers, eleven female teachers, 118 male and 158 female pupils, making the total number of pupils 276; average attendance during the past year was 227; there are twenty-one classes, the books used in school being Book of Mormon, Bible and Testament, Doctrine and Covenants, Voice of Warning; JUVENILE INSTRUCTOR, 1st and 2nd Readers, Primers and Charts. The school owns 150 books which are used as class books, besides a library of 170 volumes. Upwards of sixty dollars have been subscribed during the year, part of which has been given to the school in prizes, the balance to be distributed in the same way as soon as suitable prizes can be procured. The school is in a prosperous condition, under the management of Wm. A. Noble and Seth Langton superintendents and Francis Sharp secretary and treasurer. The evening of the 22nd was devoted to singing and recitations by the scholars of the school, a considerable portion of the exercises being from your valuable paper, which I hope will long continue to shine, as a bright luminary, to guide the youth of Zion.

Your Brother,

FRANCIS SHARP.

SUNDAY LESSONS. FOR LITTLE LEARNERS.

ON THE HISTORY OF JOSEPH SMITH, THE PROPHET.—LESSON VII

Q.—What else did he say to him?

A.—He said this is my beloved son, hear him.

Q.—Did they say anything more to him?

A.—Yes, they told him about the true gospel.

Q.—Did Joseph ask them which of the religious societies he should join?

A.—Yes.

Q.—What did they tell him?

A.—They told him not to join any of them.

Q.—Why not?

A.—Because they were all wrong.

Q.—In what were they wrong?

A.—Their creeds of religion were an abomination in his sight.

Q.—What else was wrong about them?

A.—They taught for doctrines the commandments of men.

Q.—What did the Lord say about their forms of religion?

A.—He said they had a form of godliness but denied the power thereof.

Q.—What promise did the Lord make to Joseph?

A.—That the true gospel should be made known to him at some future time.

Q.—Was this the first time that Joseph Smith had a visit of Heavenly beings?

A.—Yes.

Q.—What were their names?

A.—God the Father, and Jesus Christ his son.

Q.—Did Joseph tell anybody what he had seen and heard?

A.—Yes he told his father, and the rest of the family.

The Juvenile Instructor.

GEORGE Q. CANNON, - - - - - EDITOR.

SATURDAY, APRIL 3, 1875.

EDITORIAL THOUGHTS.

GREAT good can be accomplished for the rising generation of this Territory by organizing societies of the right character under the direction of wise and zealous Elders in the various wards and settlements. We have an illustration of the good effects of such an organization in the case of the "Institute" of the 20th Ward in this city. A few active, judicious brethren in that ward organized this society to which we refer. During the long winter evenings they have had weekly meetings. At first, the meetings of the "Institute" excited no special interest: but few attended, and an indifference on the part of the young people and others who, it was hoped, would take part in its proceedings, was very apparent. Perseverance in this instance, as in so many others, at last, however, received its reward. The founders of the society were determined to accomplish the object for which they started; they would not allow themselves to be discouraged. The results have been most gratifying, a general interest was awakened. Young and middle aged, and even aged, people attended the meetings to listen to the proceedings. By degrees one and another were induced to take part, and to contribute their share to the general instruction. Such of the members as feel inclined, furnish papers to be read to the "Institute." They are written upon various subjects: some on scientific topics, others narratives of travel, others sketches of history, descriptions of perils and adventure which the writers have encountered, others essays; each one selecting his own topic, and treating it in his own style. Of course religion is not ignored. It is blended in all the exercises and in all the writings, the members of the Institute never, for a single meeting, forgetting the fact that they are Latter-day Saints. These papers, being written on writing paper of one size, are fastened together, and they form a manuscript volume of considerable merit. We have had the pleasure of publishing in the JUVENILE INSTRUCTOR several articles which were written for perusal before the "Institute."

One of the most gratifying features connected with this society is the effect the proceedings are having upon the young of both sexes. They take pleasure in the meetings, are punctual in attendance, the girls, especially, furnishing delightful singing, and little boys have ventured to write articles which have been listened to with kind approbation. At these meetings pains are taken to make the young people feel at home, to not overshadow them or to make them sensible of how little importance they are compared with their older associates. The saying, so frequently used under the old system of training, that "little folks should be seen and not heard," is entirely discarded in the 20th Ward Institute. The young people are encouraged and treated with proper consideration. If there were more of this in private circles and in the general associations of the people than there is, many

young persons would not grow up so awkward and bashful as they do; but they would have more confidence and escape much subsequent suffering when called to act their parts in other spheres.

From a printed copy of the Constitution and By-laws which we have before us, we learn that the "Institute" was organized January 20th, 1873, "its object being the intellectual, moral, social and religious improvement of its members." On the 26th of March, just passed, there were one hundred and twenty-five members. The formation of a library has been commenced for the benefit of the members; it comprises about sixty volumes, nearly all of which are valuable. The election of officers is held annually. Elder John Nicholson has been elected President of the "Institute" since its organization, and efficient directors have also been chosen.

So long as the "Institute" shall be conducted as it has been, it cannot fail to have the heartiest wishes for success of all true friends of education and progress. It will assuredly accomplish great good, and if properly maintained, will become a strong and beneficent organization, the influence of which will be widely felt. We wish there were many more such societies in the Territory.

As an illustration of the transmission of bad qualities from a parent to children, the following is one of the most striking we have ever met. Dr. Harris of New York has been giving some very curious and remarkable criminal statistics to the public. His attention was called, some time since, to a county on the upper Hudson, which showed a remarkable proportion of crime and poverty to the whole population—180 of its 40,000 inhabitants being in the alms house—and, upon looking into the records a little, he found certain names continually appearing. Becoming interested in the subject, he concluded to search the genealogies of those families, and, after a thorough investigation, he discovered that from a young girl named "Margaret" have descended two hundred criminals. This girl was left adrift, nobody remembers how, in a village of the county, seventy years ago, and, in the absence of an alms house, was left to grow up as best she could. As an illustration of this remarkable record, in one single generation of her unhappy line there were twenty children; three of these died in infancy and seventeen survived to maturity, of the seventeen, nine served in the State prisons for high crimes an aggregate term of fifty years, while the others were frequent inmates of jails and penitentiaries and almshouses. The whole number of this girl's descendants, through six generations, is over six hundred, and besides the two hundred who are on record as criminals, a large number have been idiots, imbeciles, drunkards, lunatics, prostitutes and paupers!

This statement conveys a lesson to all who intend to marry, which they should not be slow to remember and profit by. They should be careful about forming associations for life that are not of the very best character. There must have been something radically bad about this girl, "Margaret's," nature, as well as connected with her training, to have had such a terrible effect upon her descendants. If a bad person can leave such an impress for evil upon her posterity, is it not reasonable to suppose that one possessed of good qualities and marked traits of character can be so fortunate as to impress them for good for generations? Certainly the probabilities are that such a parent would do so. Therefore, how careful people should be in selecting partners for life. Better to have a humble, faithful, though poor man, of the right kind, for a husband than to be married to the finest looking, richest man

in the world of bad qualities. Better indeed for the man of good qualities to have numerous wives, and to be the parent of a large number of children, than for a man of the other kind to have any. The one would be likely to leave a posterity that would enrich the world, while the other might leave those who would only, as in the case of this woman "Margaret's" descendants, be a curse to the community. So, also, with the selecting of a wife. A virtuous woman of good qualities, associated with an honorable man, would likely leave in her posterity, a race renowned for the virtues she herself possessed; but in each of the children of one of the other class there would probably be seen a perpetuation of the evil passions to which she herself was a prey.

To understand how careful wise men of God were in ancient days to have their children form the right kind of associations in marriage, we refer you to Abraham (see Genesis chap. xxiv) and Isaac (see Genesis chap. xxvi, verses 34 and 35; also chap. xxvii, verse 46; also chap. xxviii) and to the law given through Moses to Israel (see Deuteronomy chap. vii, verses 1 to 4). Esau's descendants were not blessed as were those of his brother Jacob, and this is doubtless due, in part at least, to the character of the wives of Esau. The same may be said about the children of Isaac and Ishmael. And may not some, at least, of the differences between those two brothers be due to the different characters of their mothers?

One of the grandmothers of the writer, a woman of shrewd observation, was in the habit of impressing upon her sons in a plain manner the same lesson conveyed by the examples we have given. Her remark was: "My sons, if you want to pick a dog, (and more so a wife) be sure and select one out of a good family."

SECOND-HAND FOOD.

It has been truthfully said that one half of the world do not know how the other half live. We thought so in reading lately some sketches of life in Paris.

In the early morning in that city curious looking, closed carts, with a sort of funnel in the top to admit air, drawn by scraggy-looking horses, and attended by meagre-looking men, are driven to the back gates of fine houses where the rich people of the city reside. When they drive up the servants of the house carry out large baskets and boxes of provisions, which are emptied pell-mell into the carts, without any care being taken to keep the various articles from mixing. These provisions are nothing more nor less than the remains from the aristocratic tables within. The choice dishes of the prince, the duke, the general, the ambassador and other distinguished people who live side by side, come to this end at last. After the guests have dined off them up stairs, they descend to the kitchens. There the servants eat their fill. What is left falls to the cook as his "perquisite," who sells the whole in a jumble to the man with the mysterious cart. Fruit and roast beef, pies and cucumbers, fish and chicken, and every other variety of food, are mixed up in one mass, and sold in a lump to the men with the carts.

Where do you think this all goes to? In this country you would say to feed the hogs, the chickens or the dogs. But not so in France. In Paris there are thousands who must live cheap or not at all. If a man have but a few cents in the world with which to buy food, he must not be too particular about its flavor.

There are markets in Paris where this "second-hand" food is sold. The men with the carts are in the service of the men

who sell this food, and every morning they gather their stock for the day. They have a back room in some old house in an obscure street, to which the carts are driven to be unloaded. This is hired for the purpose of sorting the food. It would not answer to have this operation performed where it could be seen by curious and prying eyes. The public might be too easily disgusted, and the markets for "second-hand" food might not have so good a run of custom. If the purchaser knew all the processes through which the food went before it reached his lips, it might impair its flavor to his taste; but he eats in happy ignorance of this, and with a relish that is above suspicion.

The men who sort the contents of the carts do so with amazing rapidity and skill. They first pick up the best morsels—the tit-bits and the roasts and cutlets least damaged—and pare and clean them. Then they arrange them upon huge platters in such a style as to delude the purchaser who is not in the secret of their origin, that they are the parts of a recently-cooked morsel. It is only the presentable fragments, and those which are capable of innocently deceiving, that are exposed for sale at the stalls. By ten or eleven o'clock in the morning the food is sorted and ready for the customers, who are also ready for their breakfasts. The food sells briskly; indeed, the owners of the stalls are often oppressed by the crowd of greedy applicants for their cheap bounty.

After the first sorting over has been finished, there remains a great mass of mixed stuff to be disposed of. It is surprising as well as amusing to observe to how many uses the morning's cart-load of mixed stuff is put. Those morsels and pieces—the broken pies and lobsters and small messes of various kinds—which are not salable to men and women, are now again neatly sorted, divided into various heaps, and put into neat-looking carts. These carts are wheeled by boys into the same back streets where the original mass was gathered, and their contents sold to the same households to be used as the daily food of the pet dogs and cats. Thus, the dog finally gets "the crumbs which fall from his master's table," but in a round-about manner. First, his master's cook having sold them as his "perquisite;" and second, the same shrewd individual having bought them back again for at least triple the price first paid for them. But, in the second sorting, all the bones have been carefully separated from the rest; and these form a third source of profit to these dealers in "second-hand" food. There are in Paris manufacturers of meat lozenges. These bones are, in the first instance, sold to them. They, having finished their peculiar use for them, sell them to the manufacturers of "animal black," used by the painters. That probably is at last the end of them.

Many of these dealers in "second-hand" food derive large profits from their trade, and retire in a few years with a comfortable income.

In large modern cities it is wonderful how everything is utilized, or brought into use. Nothing is allowed to go to waste. This is plain from the description we have given of the manner of disposing of this waste food in Paris. In large cities in England men go about gathering up and buying bones, rags, scraps of iron, old bottles, old clothes; even the very manure dropped by animals in the street we have seen women gathering up in baskets and carrying on their heads to some place where they could pile it up to sell.

In our next number we shall give another sketch of a method of collecting and disposing of scraps of bread in Paris, that will probably be interesting to our juvenile readers.

Old America.

BY G. M. O.

THE TOLTECS.

IT is impossible to know anything to a certainty in regard to the people of ancient America, as all, or nearly all of the old books are lost or destroyed. The few annals preserved furnish but vague and dreamy outlines of the past. Here and there a faint gleam of light breaks the obscurity, only sufficient to show at different periods in the history a reasonable and passable outline.

When Cortez subjugated Mexico the Aztecs had been in power more than two centuries. Extensive ruins and splendid monuments of art attest that a highly civilized people had, centuries before, occupied Anahuac. This race had not only peopled Mexico proper, but also Central America, and doubtless South America, as traces of a like civilization are found in these localities. Most of the ancient history of the Aztecs relates to ages previous to their time, and chiefly to their predecessors, the Toltecs. But, according to these writings, the country where the vast ruins are found was occupied at different periods by three distinct peoples, the Chichimecs, the Colhuas, and the Toltecs or Nahuas.

Jefferies supposes the Toltecs arrived in Anahuac in the year 648, A. D. Baldwin, more properly, asserts that they came into the country about one thousand years before the Christian era; and it appears their supremacy ceased and left the country broken up and divided into small states two or three centuries before the arrival of the Aztecs.

The knowledge of astronomy and the correct measurement of the year known to Montezuma's people were methods adopted from and formerly in use among the Toltecs. "And," says Baldwin, "it is not reasonable to refuse to give some attention to their chronology, even while doubting its value as a means of fixing dates and measuring historical periods." De Bourbourg says: "In the histories written in the Nahuatl language, the oldest certain date is nine hundred and fifty-five years before Christ." This is the oldest date in the history of the Toltecs which has been accurately determined; and he arrives at this date by the following calculation, which is quoted from the "Codex Chimalpopoka," one of the oldest American books still preserved: "Six times 400 years, plus 113," previous to the year 1558 A. D. This is given as a date of the division of the land by the Toltecs; that is, a division was made 2513 years previous to 1558 A. D., or in the year 955 B. C. The Toltecs issued, if this date be accepted, more than a thousand years before the Christian era, from a country called Huehue-Tlapalan, somewhere at a distance to the northeast, undoubtedly the Ohio and Mississippi valleys.

Sahagun learned from the old books and traditions that the Toltecs came from a distant north-eastern country. He mentions a company that settled near the Tampico river, and built a town called Panuco. De Bourbourg finds an account of this or another company preserved at Xilaneo, an ancient city, situated on an island between Lake Terminos and the sea. This city was famous for its commerce, intelligence and wealth. The company came from the north-east, it is said, to the Tampico river. It consisted of twenty chiefs and a large company of people. Torquemada also found a record, which describes them as a people fine in appearance, industrious,

orderly and intelligent; also that they worked in metals and were skillful artists and lapidaries.

All the accounts say the Toltecs came at different times by land and sea, in small companies, and always from the north-east. This can only be explained by supposing they came from the mouth of the Mississippi river along the coast, and by land through Texas. But the country from which they came was invariably Huehue-Tlapalan. Cabrera and Torquemada say the name of the country was simply Tlapalan; but that they called it Huehue (old) to distinguish it from three other Tlapalans which they founded in their new kingdom; and it seems not improbable that the old Tlapalan was the country of our Mound Builders.

In connection with the account of the Toltec migration another circumstance is mentioned: that Huehue-Tlapalan was invaded by the Chichimecs (meaning barbarous aboriginal tribes, united under one leader). Baldwin gives a statement, a little condensed, of this transaction: "There was a terrible struggle, but, after about thirteen years, the Toltecs, no longer able to resist successfully, were obliged to abandon their country to escape complete subjugation. [Two chiefs guided the march of the emigrating nation. At length they reached a region near the sea, named Tlapalan-Conco, where they remained several years. But they finally undertook another migration, and reached Mexico, where they built a town called Tollanzinco, and, later, the city of Tullan, which became the seat of their government." This Chichimec invasion is placed at a period in the chronology of the old native books long previous to the Christian era.

According to the manuscript of Don Juan Torres, grandson of the last king of the Quiches, the Toltecs descended from the house of Israel, who were released by Moses from the tyranny of Pharaoh. This story runs as follows:

After they had fallen into idolatry, to avoid the reproofs of man, they separated from him (Moses), and, under the guidance of Tanub, passed from one continent to the other, landing at a place called the "Seven Caverns," a part of the kingdom of Mexico, where they founded the city of Tula. From Tanub sprang the kings of Quiche and the first monarchs of the Toltecs.

The Toltecs were the most celebrated nation of Anahuac; they always lived in a social manner, collected into cities under government of regular laws. Their superior civilization and skill in the arts were adopted by all the civilized nations of Mexico. They were not very warlike, preferring the civilization of the arts to the exercise of arms. If not the inventors, they were at least the reformers of the admirable system of the arrangement of time, which was adopted by the nations of Mexico. Boturini gleaned from their ancient histories that during the reign of one of their kings, Ixtlaleuechahuac, a celebrated astronomer named Huematzin, by the king's consent, assembled all the wise men of the nation, and with them painted that famous book called "Teomoxth, or Divine Book, in which were represented, in plain figures, the origin of the Indians, their dispersion after the flood and confusion of tongues at Babel, their journey in Asia, their first settlement in America, the founding of their kingdom—as well as its progress to that time; also a description of the calendar, their mythology and mysteries of their religion, moral philosophy, in fact, all that appertained to their history, religion and manners.

The same author says that the eclipse of the sun, which happened at the death of our Savior, was marked in their paintings in the year 7. Tochtli, and that some learned Span-

iards have compared their chronology with ours, and have found that they reckoned from the creation to the birth of Christ 5199 years, which corresponds with the Roman calendar.

Clavigero says: "Upon reading Boturini, I set about comparing the Toltecan years with ours, and I found the thirty-fourth year of Christ, or the thirtieth of our era, to be the 7. Tochtli."

Their religion was idolatrous, and they appear to have been the authors of the greater part of the mythology of the Aztecs; but they never practiced those barbarous and bloody sacrifices which became afterwards so common among the other nations.

Sometime about the year 1052 A. D., the Toltecan monarchy concluded. Previous to this, direful calamities happened to them: for several years heaven denied them rain, the earth, the fruits and the air were filled with mortal contagion, and consequently the greater part of the nation perished. The wretched remains sought relief to their misfortunes by scattering themselves over the territory south and north of their kingdom. After the destruction of the Toltecs, for nearly a century, the land remained solitary and almost entirely deserted.

(To be Continued.)

THOMAS TOPHAM.

THOMAS TOPHAM, born in London about 1710, and brought up to the trade of a carpenter, though by no means remarkable in size or outward appearance, was endowed by nature with extraordinary muscular powers and for several years exhibited wonderful feats of strength in London and the provinces. The most authentic account of his performances was written by the celebrated William Hutton, who witnessed them at Derby. "We learned," says Mr. Hutton, "that Thomas Topham, a man who kept a public house at Islington, performed surprising feats of strength, such as breaking a broomstick of the largest size by striking it against his bare arm, lifting three hogsheads of water, heaving a horse over a turnpike-gate, carrying the beam of a house like a soldier does his firelock, and others of a similar description." However belief might at first be staggered, all doubt was removed when this second Samson came to Derby, as a performer in public.

The regular performances of this wonderful person, in whom was united the strength of twelve ordinary men, were such as the following: Rolling up a pewter dish, seven pounds in weight, as a man would roll up a sheet of paper; holding a pewter quart at arm's length, and squeezing the sides together like an egg-shell; lifting two hundredweights on his little finger, and moving them gently over his head. The bodies he touched seemed to have lost the quality of gravitation. He broke a rope that could sustain twenty hundred-weight. He lifted an oaken table, six feet in length with his teeth, though half a hundred-weight was hung on the opposite extremity. Weakness and feeling seemed to have left him altogether. He smashed a cocoa-nut by striking it against his own ear; he struck a bar of iron, one inch in diameter, against his naked arm, and at one blow bent it into a semicircle.

"Though of a pacific temper," says Mr. Hutton, "and with the appearance of a gentleman, yet he was liable to the insults of the rude. The hostler at the Virgin's Inn, where he resided, having given him some cause of displeasure, he took one of the kitchen spits from off the mantel-piece, and bent it round the hostler's neck like a handkerchief; where it excited the laughter of the company, till he condescended to untie it.

This remarkable man's fortitude of mind was by no means equal to his strength of body. Like his ancient prototypes he was not exempt from the wiles of a Delilah, which brought him to a miserable and untimely end—August 10, 1749.

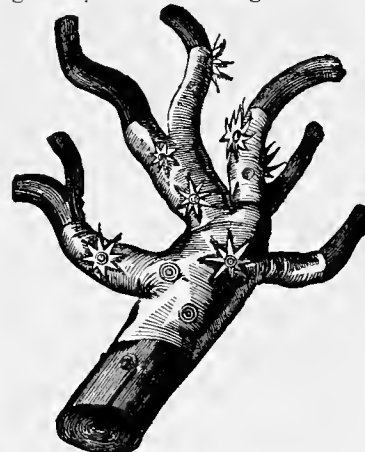
CORAL.

(Continued.)

THERE is much that is suggestive of thought to the observer of nature in the structure of these corals and their application in effecting changes in the form of the earth. The coral-bearing area of the Pacific ocean is said to be twelve million square miles in extent; a space nearly as large as that of the continent of Africa, or of America and Europe. Then we have abundant evidence of the formidable area of coral operations in the earlier period of world-forming, as seen in the vast deposits of limestones, almost entirely formed by ancient corals. And all this work is brought about by organisms of a very low type, that differ very slightly from the most primitive types. As to the reef-building species of polyps, they so nearly resemble vegetables in their form of growth, that for a long time they were not suspected to be animals. They increase by a process of budding.

Dana says:

"The bud commences as a slight prominence on the side of the parent. The prominence enlarges, a mouth opens, a circle of tentacles grows out around it, and increase continues until the young finally equal the parent in size. Since in these species of corals the young do not separate from the parent, this budding produces a compound group."



CORAL OF COMMERCE.

From this it is easy to understand that while the polyps exist as separate individuals, they are closely connected by coralline substance and the living tissues. After a time the masses of coral matter below have no living creatures in them; they become dead or deserted, the living matter being on the surface. The interstices gradually get filled in with particles of lime, precipitated from the water, and other earthy material held in suspension by the ocean. In some places sand and sediment thrown down actually interferes with the growth of the colony of polyps; they are killed and the reef becomes barren. This is one reason why the coral island or "Atoll" is frequently a mere reef instead of a level surface; perhaps crescent shaped with an opening through which ships can sail into it; or a complete circle in the center of which is a lagoon shut off from the ocean.

In this article it will be impossible to name all that is curious about the tiny architect that has done so much in world building, the limestones of our quarries and of most of our canyons abound in evidences of the former existence of corals in immense multitudes, as the entire mass is composed of different varieties of these polyparies, or dwellings of the ancient polyps.

If you would have a thing kept secret, never tell it to any one; and if you would not have a thing known of you, never do it.

Questions and Answers

ON THE BIBLE.

BOOK OF RUTH.

LESSON LXXXV.

- Q.—How long did Ruth continue to glean?
 A.—“Unto the end of barley harvest and of wheat harvest.”
 Q.—With whom did she dwell during this time?
 A.—Her mother-in-law.
 Q.—After a while, whom did Boaz call before ten of the elders of the city?
 A.—A nearer kinsman of Naomi’s than himself.
 Q.—For what purpose?
 A.—To see whether he would redeem the land of Elimelech according to the law of Israel.
 Q.—What reply did this kinsman make?
 A.—“I cannot redeem it for myself, lest I mar mine own inheritance: redeem thou my right to thyself; for I cannot redeem it.”
 Q.—What was the manner in Israel to confirm all things in redeeming and changing?
 A.—“A man plucked off his shoe and gave it to his neighbor; and this was a testimony in Israel.”
 Q.—What further answer did the kinsman make unto Boaz?
 A.—“Buy it for thee. So he drew off his shoe.”
 Q.—What then did Boaz say to the elders and unto the people?
 A.—“Ye are witnesses this day, that I have bought all that was Elimelech’s, and all that was Chilion’s and Mahlon’s, of the hand of Naomi.”
 Q.—What else did he say?
 A.—“Moreover Ruth the Moabitess, the wife of Mahlon, have I purchased to be my wife, to raise up the name of the dead upon his inheritance, that the name of the dead be not cut off from among his brethren.”
 Q.—What did the people and the elders say?
 A.—“We are witnesses. The Lord make the woman that is come into thine house like Rachel and like Leah, which two did build the house of Israel.”
 Q.—What did the women say to Naomi?
 A.—“Blessed be the Lord, which hath not left thee this day without a kinsman that his name may be famous in Israel.”
 Q.—What was the name of the son born unto Boaz and Ruth?
 A.—Obed.
 Q.—Who was Obed the father of?
 A.—Jesse, the father of David.

FIRST BOOK OF SAMUEL.

- Q.—What was the name of a certain man of Mount Ephraim?
 A.—Elkanah.
 Q.—How many wives did he have?
 A.—Two.
 Q.—What were their names?
 A.—Hannah and Peninnah.
 Q.—Which of them had no children?
 A.—Hannah.
 Q.—How often did Elkanah go up out of the city to worship and sacrifice unto the Lord of hosts?
 A.—Yearly.
 Q.—At what place?
 A.—In Shiloh.
 Q.—Who were the priests who were there?
 A.—The two sons of Eli.
 Q.—What were their names?
 A.—Hophni and Phinehas.
 Q.—Who was Eli?
 A.—A prophet of the Lord.
 Q.—When Hannah went up to worship what vow did she make unto the Lord?
 A.—That if he would give her a son, she would give him unto the Lord all the days of his life.

Questions and Answers

ON THE BOOK OF MORMON.

REIGN OF THE JUDGES.

LESSON LXXXV.

- Q.—What were the feelings of those Nephites who would not obey the commandments of the Lord?
 A.—They desired to kill their more righteous brethren.
 Q.—What office did many of these dissenters hold?
 A.—That of lower judge.
 Q.—Who was their leader?
 A.—Amalickiah.
 Q.—What did they desire of Amalickiah?
 A.—They wanted him for a king.
 Q.—What did they expect if he should get that office?
 A.—They hoped to get higher offices.
 Q.—When Moroni heard of this how did he feel?
 A.—He was very angry with Amalickiah.
 Q.—What did he do?
 A.—He tore his coat, and took a piece of it and wrote upon it.
 Q.—What did he do with it?
 A.—He fastened it upon a pole and put on his armor.
 Q.—What did he ask the Lord for?
 A.—He prayed for the blessings of liberty to be preserved to his brethren and their families.
 Q.—After praying to the Lord, what did Moroni do?
 A.—He went forth in the land, showing the writing on the piece of coat, and called upon the people to come forth and enter a covenant to protect their freedom and rights.
 Q.—What was the result of this action on the part of Moroni?
 A.—The people came from all sides, arrayed in armor.
 Q.—What token did they give?
 A.—They rent their clothes.
 Q.—What were the followers of Amalickiah called?
 A.—Amalickiahites.
 Q.—When Amalickiah saw that his followers were less in number than those who remained true, what did he do?
 A.—He took all his people who would go and departed into the land of Nephi.
 Q.—When Moroni saw that Amalickiah would stir up the Lamanites to anger against the Nephites what did he do?
 A.—He took an army and marched out to prevent Amalickiah from reaching the land of Nephi.
 Q.—Did he succeed in his plan?
 A.—Yes; and Amalickiah and a small number fled; the rest were taken prisoners.
 Q.—How were those treated who entered into a covenant to maintain their freedom?
 A.—They were liberated.
 Q.—What was done to those who would not do this?
 A.—They were put to death.
 Q.—Were there many who denied the covenant of freedom?
 A.—There were only a few.
 Q.—When this rebellion or civil war was ended what course did Moroni take?
 A.—He caused the standard of liberty to be hoisted upon every tower in the land.
 Q.—What followed this vigorous maintenance of the government by Moroni; were the people loyal?
 A.—Yes, and peace prevailed.
 Q.—For how long?
 A.—For four years, or until nearly the end of the nineteenth year of the reign of the judges.
 Q.—What diseases, are we told, were very frequent in the land which the Nephites occupied?
 A.—Fever.

A SCOTTISH TRADITION-
ARY STORY

GRIZEL COCHRANE.

(Continued.)

Sir John had no sooner, however, expressed his feelings on this subject, than his daughter became sensible that, in order to palliate his misery, she must put a strong curb upon her own, and in a short time was calm enough to enter into conversation with her father upon the dismal subject of his present situation, and to deliver a message from the old earl, her grandfather, by which he was informed that an appeal had been made from him to the king, and means taken to propitiate Father Peters, his majesty's confessor, who, it was well known, often dictated to him matters of state. It appeared evident, however, by the turn which their discourse presently took, that neither father nor daughter was at all sanguine in their hopes from this negotiation. The Earl of Argyll had been executed but a few days before, as had also several of his principal adherents, though men of less consequence than Sir John Cochrane; and it was therefore improbable that he, who had been so conspicuously active in the insurrection, should be allowed to escape the punishment which his enemies had now in their power to inflict. Besides all this, the treaty to be entered into with Father Peters would require some time to adjust, and meanwhile the arrival of the warrant for execution must every day be looked for.

Under these circumstances, several days passed, each of which found Miss Grizel Cochrane an inmate of her father's prison for as many hours as she was permitted. During these interviews of the father and daughter, while heart clung unto heart, they reaped all the consolation which an undisguised knowledge of the piety and courage of each could bestow. Still, after such intercourse, the parting scene which they anticipated seemed more and more dreadful to think of; and as the daughter looked on the pale face and dejected countenance of her parent, her bosom was penetrated with the sharpest pangs. The love of her father might be termed a component part of her nature. She had cherished this filial love ever since she possessed a consciousness of thought, and it was now strong and absorbing, in proportion to the danger in which he stood. Grizel Cochrane was only at that period eighteen years old; but it is the effect of such perilous times as those in which she lived to sober the reckless spirit of youth, and make men and women of children. She had, however, a natural strength of character, that would on all extraordinary occasions have displayed itself without such a tuition, and which, being now joined with what she conceived the necessity of the case, rendered her capable of a deed which has caused her history to vie with that of the most distinguished of heroines.

Ever since her father's condemnation, her daily and nightly thoughts had dwelt on the fear of her grandfather's communication with the king's confessor being rendered unavailable, for want of the time necessary for enabling the friends in London, to whom it was trusted, to make their application, and she boldly determined to execute a plan whereby the arrival of the death-warrant would be retarded. A short time, therefore, before it was expected by the council in Edinburgh, she thought it necessary, in her visit to her father, to mention that some urgent affair would prevent her from seeing him again for a few days. Alarmed at this, and penetrating her

design of effecting something in his favor, he warned her against attempting impossibilities.

"Nothing is impossible to a determined mind," said she, "and fear nothing for me."

"But the inexperience of youth, my child," he replied, "may involve you in danger and in blame; and did you but know the characters of those you must encounter, while vainly pleading for your father's life, you would fear, as I do, the sully of your fair fame."

"I am a Cochrane, my father," said the heroic girl—an answer how brief, but to him how expressive! He could say no more: he beheld in his child, so young, so beautiful, and so self-devoted, all the virtues of her race combined; and he felt for the moment that the courage she had prayed for would be granted, to carry her through the undertaking she meditated, whatever that might be. She felt grateful to her father that he did not urge her further; but she trembled as she turned, at her departure, to catch another look of those loved and venerated features, for his eye appeared to be following her with a parting expression, which seemed to say it was the last fond look.

At that time, horses were used as a mode of conveyance so much more than carriages, that almost every gentlewoman had her own steed; and Miss Cochrane, being a skillful rider, was possessed of a well-managed palfrey, on whose speed and other good qualities she had been accustomed to depend. On the morning after she had bid her father farewell, long ere the inhabitants of Edinburgh were astir, she found herself many miles on the road to the Borders. She had taken care to attire herself in a manner which corresponded with the design of passing herself off for a young serving-woman journeying on a borrowed horse to the house of her mother, in a distant part of the country; and by only resting at solitary cottages, where she generally found the family out at work, save perhaps an old woman or some children, she had the good-fortune, on the second day after leaving Edinburgh, to reach in safety the abode of her old nurse, who lived on the English side of the Tweed, four miles beyond the town of Berwick. In this woman she knew she could place implicit confidence, and to her, therefore, she revealed her secret. She had resolved, she said, to make an attempt to save her father's life, by stopping the postman, an equestrian like herself, and forcing him to deliver up his bags, in which she expected to find the fatal warrant. Singular as such a determination may appear in a delicate young woman, especially if we consider that she was aware of the arms always carried by the man to whose charge the mail was committed, it is nevertheless an undoubted fact that such was her resolve. In pursuance of this design, she had brought with her a brace of small pistols, together with a horseman's cloak, tied up in a bundle, and hung on the crutch of her saddle; and now borrowed from her nurse the attire of her foster-brother, which, as he was a slight-made lad, fitted her reasonably well.

(To be Continued.)

GENIUS.—Alexander Hamilton once said to an intimate friend: "Men give me some credit for genius. All the genius I have is just this—when I have a subject on hand I study it profoundly. Day and night it is before me. I explore it in all its bearings. My mind becomes pre-occupied with it. Then the effort which I make is what the people call the fruit of genius. It is the fruit of labor and thought."

HOMESICKNESS.

"HOMESICKNESS" has a powerful effect upon some natures. It is generally thought to be a sentiment which soon passes away; but the writer knows by experience that it is not always a transient feeling, as he has suffered dreadfully from it upon many occasions, and during his first lengthy absence from home the intervals were brief for one year that he did not experience "homesickness." Frequently it fades away under the influence of novel scenes and new acquaintances; but this is not always the case. Persons who live in cities, who are accustomed to mix in society, to witness changing scenes and faces, do not generally suffer from "homesickness" as those do who live in the country and who have been in contact with nature more than with man. Soldiers who have joined the army from cities, and who have been sent on long campaigns, have not suffered from "homesickness" to the same extent as recruits from country places. The same difference has been observed in sailors—those from the country being more and longer "homesick" than those from cities.

It has been noticed that people who have lived in countries where the scenery is grand and striking suffer more when they go to other lands from this sickness than those who have been brought up where the scenery is tame. The Swiss and the Highlanders of Scotland are examples of this kind. Even the Laplanders and the Esquimaux, gloomy and forbidding as the surroundings of their native lands are, when taken to other countries pine for their unlovely and uncomfortable huts, the broad expanse of snow and ice, the grand and terrible glaciers, which form their country, and their reindeer and tractable dogs. An illustration of the overpowering nature of this yearning for home is the case of a company of Greenlanders who were carried to Denmark to exhibit.

Greenland is a most forbidding and dreary land to reside in, and its inhabitants, we would imagine, would be glad to stay away from it if they could get to any other land, like Denmark for instance. But it is said of this company that, though kindly treated, well-fed and amused, day after day, they would wander to the sea-shore, and there, sitting silent, and brooding on the sands, would strain their eyes, dim with tears, in a vain hope to descry afar off across the waters the bleak and sterile shore of their loved home. At length, rendered utterly miserable by their longings, they took advantage of an opportunity when they were not observed, and launched their little canoes and set forth on their impossible voyage. They chose to brave certain death rather than remain longer in exile from the home which they loved so dearly.

Those who have lived in these mountains for any length of time, or who were born here, and have had occasion to go to the States or to some foreign land for a year or longer can form some idea of the feelings of those Greenlanders. These mountains and valleys are very attractive, and those who reside in them become greatly attached to them, so much so that, as a general thing, they cannot leave them without suffering from "homesickness." The writer has had occasion to leave them frequently on missions of various kinds; but he never thought of them while absent without yearning for a sight of them, and his feelings upon returning and catching a glimpse of the dull and tame plains has always been one of great delight.

"Homesickness" is frequently a cause of desertions of soldiers. It is said that the French are more subject to this sickness than the Americans or the English. During the campaigns of the First Napoleon the French army of the

Rhine lost hundreds and thousands of men by desertions from that cause alone. To guard against such results, we understand, it has been found necessary in the French army to give orders that any conscript suffering under a marked and serious attack of *maladie dupays* (or as we would say, "homesickness") shall be returned to his home for cure. The reason that conscripts are likely to feel strongly their absence from home is, they are drawn by lot, and compelled to serve as soldiers and sailors.

Among sailors "homesickness" is sometimes not confined to individual cases. It has been known to spread among a crew of men like cholera or the plague, and with equal rapidity and violence. The men would become utterly disheartened, sink into inaction, or refuse to obey orders and become mutinous. There have been cases known of this sickness assuming an epidemic form among the slaves in the West India Islands. Numbers of these poor wretches, in their despair, have hung themselves to the branches of trees surrounding the plantations where they labored.

In Switzerland the herdsmen perform upon the Alphorn a variety of simple and touching melodies. They are known under the general name of "*Ranz des Vaches*." In former years numbers of the Swiss were enrolled in the French army. When the bands played that tune the effect upon the Swiss conscripts was painfully severe. They would burst into tears, cast themselves upon the ground, and give way to uncontrollable grief. The tune brought vividly to mind the home scenes, and they could not resist its influence. It was, therefore, deemed necessary to forbid the playing of that tune by the bands of the French army.

The scientific name for this sickness is *nostalgia*.

THE Puzzle published in No. 5 may be solved by the use of the vowel "E," which, by being inserted between the consonants given, will form the following couplet:

"Persevere ye perfect men;
Ever keep these precepts ten."

We have received correct solutions from Eliza Howard, Deweyville; Frank R. Snow, St. George; R. J. Filce, Kaysville; Wm. T. Birks, Bellevue; Sina Nielson, Annie Featherstone, American Fork; J. M. Ballinger, Pleasant Grove; Ellen E. Culmer, Kate A. Miller, Salt Lake City.

GRINDING THE HANDSAW.—Have you ground all the tools right, as I told you this morning when I went away?" said a carpenter to a rather green lad whom he had taken for an apprentice. "All but the handsaw, sir!" replied the lad promptly: "I couldn't get all the gaps out of that."

JUVENILE INSTRUCTOR

Is Published in Salt Lake City, Utah Territory,

EVERY OTHER SATURDAY.

GEORGE O. CANNON, EDITOR & PUBLISHER.

TERMS IN ADVANCE

Single Copy, per Annum — — \$2 00.

Office, South Temple Street, one block west of Tabernacle, Salt Lake City, Utah.

All Communications to this Office should be directed, EDITOR JUVENILE INSTRUCTOR."